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Vol. XXXVIII No. 11

ALBANY MEDICAL ANNALS

Journal of the Alumni Association of the
Albany Medical College

NOVEMBER, 1917

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Journal of the Alumni Association of the Albany Medical College

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EDITED BY

J. MONTGOMERY MOSHER, M. D.

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VOL. XXXVIII NOVEMBER, 1917 No. 11

ALBANY MEDICAL ANNALS

Original Communications

IMPORTANCE OF INTENSIVE STUDY OF THE CRIMINAL HIMSELF.

Delivered before the Albany Social Science Society in State Education Auditorium, January 15, 1917.

BY HON. HARRY OLSON,

Chief Justice, Municipal Court, Chicago.

"Know thyself" was represented more than two thousand years ago to be the highest attainment for which human beings could strive.

Dr. Pinel in Paris more than a hundred years ago called attention to the great number of volumes adorning the shelves of libraries in comparison with the meagre record of exact observations conducted upon individuals.

Upon entering the medical department of the Crerar Library with a friend, he said to me: "Here is where you get the material for your talks about the Psychopathic Laboratory." I was obliged to reply, without realizing how important it was, that I did not; that I got it from John Doe and Richard Roe, from thousands of individuals charged with crime who came to my notice during twenty years' daily experience in the courts, interpreted in the last few years, in the light of testimony in court and demonstrations in the Psychopathic Laboratory by the director.

During ten years' experience as a public prosecutor in the criminal courts of Cook county the fact was constantly being impressed upon me that large numbers of the criminal classes were defective to the extent that their defect was the cause of thir criminality. Especially was this so of many offenders of adolescent age.

The first fact that attracted my notice was the uniformity of the number, character and conditions of crime. For instance, in Chicago, the aggregate number of arrests for felony from year to year is as uniform, proportionate to population, as the number of births. On making inquiry elsewhere, we would find that the same uniformity exists in all countries and all degrees of civilization. Only about 2 per cent of the population in most civilized countries are ever charged with crime. If we were to look into the character of crime for which convictions were had, we would find a like uniformity. If we were to ascertain the ages of those arrested and convicted, we would find that the average criminal age throughout the world is between 18 and 24.

This static character of criminal statistics in relation to population the world over; the fact that the criminal age, when most first commitments occur appears early when responsibilities come, and ranges from 16 to 24 years, and that only two per cent of the population are ever charged with crime, always impressed me as significant facts pointing to something inherently defective in the race. The investigation and research of the alienist and the psychologist tend strongly to confirm this belief.

Thus far little or no impression has been made on the static existence of crime by our efforts at punishment and prevention.

There were at one time in England 165 crimes punishable by death; in turn maiming, mutilation and branding were practised. Then the idea of adding humiliation was practiced; ducking in the pond, public square whipping posts, etc., were tried; and the idea of solitary confinement followed. The ball and chain was next added. As a reaction to these conditions the idea of reformation was introduced in penology; then came parole and probation. Yet in spite of all these efforts, extending over a long period of years, the percentage of crime and criminals remains static, about two per cent of the general population still are criminals. It may be of interest to know that it has been conservatively estimated that between one and two per cent of the general population are feeble-minded. This small per cent however is an expensive element in the community.

The cost of crime and the care of the defective classes is

becoming a great burden upon society. The State of New York now spends one quarter of its total expenditures in the care of the insane, and then more than ten thousand who need institutional care are not receiving it. The State of Illinois pays for its charitable institutions 28.1 per cent of its total expenditures, of which the mental, nervous and insane group make up 21.8 per cent, and this state, like New York, is not giving institutional care to thousands who need it. The city of Chicago expends about eight million dollars annually in handling the criminal situation, over six and one-half millions being expended for the police department alone. That we are not getting an equivalent in results for such outlays, all thoughtful people must agree. Besides, the record of assassinations and attempts made on the lives of others by insane dementia praecox and feeble-minded individuals is not a credit to our methods of handling this class.

The courts are now censuring and punishing them because they conflict with laws intended for normals and not for defectives. They are deserving of our care and consideration. The idea of full responsibility and criminality in these cases must be corrected. It is all the normal can do to hold his own in the fierce competition of modern life. The subnormal has the same desires, the same instincts to eat, to procure shelter and to preserve self, as the normal. In competition with the normal they fail and, in more direct efforts to supply needs, break laws intended only for the normal. In industry they get the lowest and poorest paid work, which, as a rule, only lasts a short time. Charity bureaus clothe, feed and find them work, and yet they do not get on. Industry more and more weeds them out as incompetency identifies them.

In view of the comparative failure of our past efforts to suppress crime, of the increasing charge upon the state in taxes for maintaining police prosecutions, courts and jails, of the menace to society of the defective delinquent when uncontrolled and running at large, and of the injustice involved in the neglect of the feeble-minded, we must adopt new methods to prevent crime and to care for the mentally afflicted. Since there is a correlation between crime and mental disease, we should try the

modern methods of the medical profession—*diagnosis* and *prevention,* where cure is impossible. As has been said in medicine, the diagnosis is half the cure; so we hope and feel in criminology that if we can diagnose the cause we will be well on the road to a cure.

Medical science has advanced, but the law has lagged behind. In the study of defectives and criminals, the medical profession, unlike the legal, has gone forward, but not with rapidity, for the youngest of all the sciences is the study of the activities of living individuals. One reason for the delayed birth of such inquiries grows out of the fact that the average physician outside the alienist group has given, as a rule, but little attention to the subject of insanity or feeble-mindedness, but leaves that field to the specialist. The average physician devotes himself to curing disease, and as there is no cure for feeble-mindedness, he is but little interested in the subject. Until a few years ago very little instruction was imparted in the medical schools in psychology and psychiatry. The financial rewards were not inviting in this field, nor were the prospects of successful achievement on a par with the opportunities in internal medicine or surgery. If the ordinary physician has lacked interest in the subject, what must be said of the lawyers and the judges? Unless a large fee were involved, which seldom was the case where the feeble-minded were concerned, the lawyer gave no attention to the subject. Our judges as a rule have little knowledge of psychology, sociology, anthropology or the significance of criminal statistics, and, if we were to judge solely by the legal test for insanity prevalent in most of our states, the medical profession is many years in advance of the legal profession. Abuses of expert testimony in the courts in insanity cases have resulted in obscuring the substantial progress made by the medical profession in the study and classification of mental diseases. Courts are beginning to rely more upon the opinions of medical men than formerly. The institution of psychopathic laboratories in connection with courts is an indication that the legal profession is beginning to appreciate that a large number of the chronic offenders are not always benefited by the legal punishment which is inflicted with the three classic objects in view—retribution,

intimidation and reformation. We are beginning to understand that the unrelenting and retributive idea of "an eye for an eye" has no application to the irresponsible. The idea of punishment for a deed presupposes responsibility. We are learning that many of the criminal insane and feeble-minded on whom legal punishment has been inflicted in our courts were not fully responsible and their punishment did not work their reformation.

Prof. Dr. Hans Gros, who died not long ago, and who was one of the foremost criminologists of the world and director of the Criminalistic Institute at the University of Gratz, Austria, one of the greatest of its kind, said in his wonderful work, "The Handbook for Examining Magistrates," that it would be much better that judges would make mistakes in sending no end of normals to the psychopathologist for examination, rather than make the mistake of passing over one who was not normal. But even if they should do this, they could never wipe out the terrible stain which rests upon them for hanging and incarcerating all these years irresponsible individuals.

Perhaps our efforts to overcome recidivism, which is a reflection on our theory and methods of punishment, have had more to do in driving us to a comprehension of the criminal than any other factor. So long as human nature is what it is, a certain amount of law infraction must be expected. A law implies its abuse or avoidance in a percentage of cases. We can not look forward ever to escape from crime in this sense. As we breed out certain grosser criminal traits, we raise our social and legal standards, and persons formerly normal become criminals by virtue of more stringent legal regulations. But with our idea of "retribution, intimidation and reformation" the habitual criminal, the recidivist, was an incomprehensive element; theoretically he should not exist; actually he is present in large numbers. This led first to the theories of the habitual criminal, the criminal mind, the physical stigmata, and all those ideas which proved on closer study to be false theories. So we have been forced to mental study for the key to the problem. If Lombroso had been an alienist and psychologist, the science of criminology would have been much further advanced.

Sweden regulated judicial procedure with reference to accused

persons of doubtful sanity as early as 1826. Before judicial judgment was pronounced the opinion of authorized physicians was submitted to the college of health for its approval. The health authorities prescribed further measures to be adopted in dealing with an accused, and not the court, where mental alienation was suspected. Experience showed that a great number of persons mentally deranged were sentenced without inquiring into their mental condition, because the existence of mental derangement was overlooked by the court in more than two-thirds of the cases, illustrating how necessary it is for our law schools to guarantee the scientific capacity of the criminal judge.

The re-discovery of Mendel's Law of Heredity has caused the archaeologist and the historian to revise his notions of the races of man, and it has also caused the alienist and psychologist to look toward heredity instead of environment as a prime factor in juvenile delinquency. The physician has learned, as we laymen are slowly learning, that we cannot change the leopard's spots by environmental means. Environment has not near the influence on the normal boy that has been assumed. Dr. Hickson of our laboratory says: "Thanks to laws of heredity, some of our greatest men have attained eminence despite the slums in which they were born and raised. The normal boy will take care of himself in any environment. That playgrounds, social centers and the like are good for him, no one will deny; that they are essential, is not true, because normality means adaptability. The social agencies do not reach the defective and cannot."

After the re-discovery of Mendel's Law, the development of psychopathology in the great German clinics of Kraepelin in Munich, Ziehen in Berlin and Bleuler in Zurich has contributed most to an understanding of the criminal. Bleuler has developed the psychological approach to mental disease to a very high state. For this reason we chose as director of the psychopathic laboratory of the Chicago Municipal Court an American physician, Dr. William J. Hickson, who had specialized in neurology and psychiatry and spent two and one-half years in the above mentioned European clinics, having been a member of Bleuler's staff for about a year, and also on the psychiatric and neurological staff of the clinic in Berlin.

In our court the chief justice has power to segregate the cases upon the calendar where offenses of a similar character and defendants of a particular group are brought together, such as the Court of Domestic Relations, in which the wrongs against women and children are adjudicated and where either the father or mother is generally the defendant; the Morals Court, in which all proceedings growing out of the enforcement of the laws against vice and immorality are heard; the Boys' Court, in which are gathered all cases for the violation of all state and city laws against boys above the juvenile court age, ranging from 17 to 21 years. These years cover the period of adolescence, the dangerous age, when most first commitments occur. In addition to these courts we have the regular criminal branch courts to the number of thirteen.

The laboratory has been in existence now nearly three years. In a great city like Chicago, 5,000 policemen are on duty daily in the enforcement of law. They apprehend those who do not conform to the normal standards demanded by law, and hence they become agents in bringing material to a great clinic. These courts, therefore, bring together daily in the City of Chicago material for the greatest clinic of abnormal psychology in this country. No medical school in the land has any such wealth of material. This great clinic would have been impossible without the development of the branch courts and without power to segregate the cases upon the calendar.

The history of these branch courts shows that a court is much more than a mere passive arbiter; that under modern metropolitan conditions a court has necessarily a profound social duty. Without in any way impairing the nature of the obligation that the court must be essentially the judicial branch of government, it must give a larger meaning to the word "judicial" in an age when society is bent upon remedial action, when it is necessary to throw light into the dark corners of our civilization and procure data essential to constructive treatment of social ills.

The laboratory has been of great assistance to the court in administering the criminal law; in enabling it to decide wisely when probation should be granted and in discriminating between punishments allowed by law. Of course, there is a certain per-

centage of more or less outspoken cases of insanity and feeble-mindedness which are more or less obvious to the laymen; a larger percentage is more or less obvious to the police judge; but a still larger number must be reserved for the identification of the expert psychopathologist. The judge is always guided by the "World Test," which Dr. Hickson says is the most adamant of them all and an assaying crucible of the highest value, which consists of the evaluation of the reactions of our cases to their environment, and a checking-up of .their capability of adjustment, their failure and successes at home, in school, at work, etc.

The intensive study of the defective criminal classes with present-day knowledge of psychiatry and psychology has brought about a real advance in the suppression of crime. We are finding a large proportion of crime is committed by the defective classes; that a considerable per cent is found to be feeble-minded and, therefore, unable to cope with the difficulties and hardships of a competitive life, and that they break down because of intellectual weakness which unfits them for anything but the simplest sort of work. We are finding that dementia praecox alone or grafted on feeble-mindedness is playing a large rôle in crime, so that it may be regarded as the criminal psychosis par excellence. We are finding that dementia praecox is only second to feeble-mindedness as an underlying cause of conflict with the law; that the vast majority of sex crimes and crimes of violence are perpetrated by the dementia praecox cases. Epilepsy is also an important factor, as are cases of moral defect. The moral defect shows a fair average, though uneven level of mental development, sometimes in their younger years passing one or two years above the average. These cases seem to lack the ability to assimilate or carry out ethical ideas. They appear, except in the lightest grade, to be incurable.

We are finding in the Domestic Relations Court feeble-mindedness, dementia praecox, both uncomplicated and complicated with alcoholism, alcoholic delusions of infidelity and other paranoid manifestations, and a respectable percentage are cases of pfropfhebephrenia, a grafting of dementia praecox upon feeble-mindedness.

We are finding in the Morals Court about the same conditions

as in the Boys' Court. They are the female equivalents of the juvenile delinquents from the Boys' Court, except that the average chronological age in this court is about 24.8 years. In a group of 283 girls from the Morals Court the director found 25, or 8.8 per cent showed average intelligence and only about 45, or 15.8 per cent might be considered capable of maintaining themselves independently. About 84 per cent of the group of 283 cases the doctor found to be definitely feeble-minded. This finding of the doctor is corroborated by the experience of a committee of the Chicago Vice Commission, of which I was a member. Under the auspices of the Chief of Police and the Health Commissioner of the city, a special committee of the Chicago Vice Commission, in 1911, in the course of its investigation, visited a famous house of ill-repute kept by a woman which had been run openly for many years, despite the laws of both city and state. So bold had she become, by reason of immunity from prosecution, that she issued circulars containing views of the rooms of her house. It was reported that this woman had, among the inmates in her house, graduates of a well-known women's college. The committee made special inquiry of the inmates, some thirty in number, who were brought before it separately, as to their schooling, age at entry into the life and as to the prevalence of disease. The rumors regarding the education of these women were not well founded. Our inquiries showed that not a single girl in the house had passed the grammar school grades. Nearly all admitted having venereal disease, and it was plain that many were feeble-minded. All claimed to have entered the life at the age of seventeen.

After three years' work with the laboratory we can say that there is a positive correlation between crime and mental defectiveness.

On the whole the underlying defective states that are responsible for crime fall quite noticeably into two main classes: The straight feeble-minded tending more to crimes of larceny and burglary, and the praecox cases, to crimes of violence and sex crimes. The large group of the pfropfhebephrenia cases (dementia praecox grafted on feeble-mindedness) seem to fall

into either classification according as the dementia praecox element or the feeble-minded element predominates.

After the foregoing groups the next principal group is the psychopathic constitution, alone or combined, and then a scattering of the various psychoses and neuroses, such as epilepsy, juvenile paresis, hysteria, etc.

The psychological method of approach to mental disease is important in a great laboratory because of the rapidity with which diagnosis can be made. Speaking of the diagnosis of dementia praecox, Dr. Hickson said in a paper read before a meeting of alienists and neurologists:

"From the clinical side, in a large percentage of these cases, there is nothing very definite on which to establish a diagnosis; while at the same time the disease is of the utmost potentiality in the thinking and doing of the victim; this is sometimes called predementia or latent dementia praecox, which, as a matter of fact, is not latent at all except in the physical sense. The psychological side may be quite well advanced and highly potential criminally, while yet there are practically no definite physical or clinical signs; in fact, as a clinical entity dementia praecox in its present advanced development can be hardly said to exist in a large proportion of cases.

"Many such physical or clinical signs should not be relied upon to make the diagnosis; and it is well known how well cases of dementia praecox paranoides can dissimulate on occasion. By the psychological method we take the diagnosis to the case in the same way that we take the tests these days to the feeble-minded, and not sit by and have to await developments as is the case in many instances diagnosed by the ordinary clinical methods, and these tests are to the dementia praecox in the reliableness and applicability what the Binet-Simon tests are to the feeble-minded. These psychological signs and symptoms are as clear and definite to the properly trained man as they are unknown or unappreciated by those unfamiliar with the method."

The laboratory has examined hundreds of alcoholics. The director says that he has yet to find the first case of chronic alcoholism where there was not at least a psychopathic constitution, dementia praecox, maniac depressive insanity, epilepsy or feeble-mindedness at the basis, with the exception of a few cases where there was a physical basis such as diabetes or tuberculosis, and the man was whipping up his flagging energy with alcoholic stimulants. The group with the mental defects at the

bottom of the alcoholism practically all show a defective heredity beyond the average. The fact should be emphasized therefore, that chronic alcoholism is secondary to some underlying mental or physical defect which is primary, and without which the chronic alcoholism would not exist.

I am publishing as an appendix to this paper a report of the laboratory on 2,700 cases. Your attention is directed to the results of the diagnosis.

I am also publishing in the appendix the result of Dr. Hickson's application of the visual memory test. These appear to be genuinely significant and furnish a clew to the type of mental trouble. These drawings show the difference between high and low grade feeble-mindedness, alcoholism, paresis, dementia praecox, etc. Several of the plates show a series of drawings by five different individuals in each group. The feeble-minded lack perception and analysis; in the alcoholic group they show a coarse, irregular, alcoholic tremor; in the drug habitue, lack of perception and a characteristic fine line with tremor; in the dementia praecox, phantasy, or the addition of finishing touches of their own; in paresis, lack of perception, analysis, and in some cases a very irregular and coarse ataxic tremor, similar to the alcoholic, except that they do not approximate the design so closely. Even the layman will see the approach here to a rough mental "finger-print" method of identification of mental disturbance.

I am also attaching to the appendix typical case histories and direct your attention particularly to the heredity.

The law does not now provide for obligatory psychiatric examinations. Whether or not a defendant goes to the laboratory is purely a voluntary matter. Of the thousands of cases that have been brought to be examined in the laboratory, the number refusing examination is almost negative, not exceeding four.

The judges take into consideration in fixing the penalty the fact of morbid disturbance of the mental faculties. On the testimony of the physician who is employed by the city and has no interest for either the plaintiff or the defendant, the court is able to protect the public from the more dangerous types

of mental defectives, as for example the dementia praecox, and especially the dementia praecox grafted on feeble-mindedness.

Judge Fisher of the Boys Court sent this last type to the reformatory, because they could be incarcerated under the law for a period of a year. These cases need permanent custody, but the law does not yet permit it. When about 100 of these cases had been committed, I received a letter from Mr. Graves, the superintendent, telling me that the boys from the Boys' Court were an incorrigible lot; that he could not reform them in a year; that it did no good to send them down there. Superintendent Graves had no idea that we were sending him a particular specimen of offender. I wrote him that he could not reform them in a year, nor in a lifetime; that we sent them to him for the safety of the public. These are the type of cases that have made the most trouble in the feeble-minded institutions. They have not been understood but have been classed with the ordinary feeble-minded.

The laws of our state in regard to insanity and idiocy are nearly seventy years old. They will have to be rewritten in the light of modern science. Our American courts have been influenced by English decisions on insanity. The English courts were slow to give up the rulings in McNaughton's case. The Lord Chancellor of England in the House of Lords on so late a day as 1862, declared that:

"The introduction of medical opinions and medical theories into this subject (of insanity) has proceeded upon the vicious principle of considering insanity as a disease."

There are a few notable exceptions in our American courts. The leading case of Parsons v. State, 2 Southern Reporter, p. 854, an Alabama case, though written thirty years ago, is abreast of modern science. Judge Simmons quoted from the German code relating to insanity, which is said to have been written by Kraepelin. His observation meets the situation of the right and wrong test from the modern point of view. Judge Simmons on page 865 makes this notable statement:

"The practical trouble is for the courts to determine in what particular cases the party on trial is to be transferred from the category of sane to that of insane criminals; where, in other words, the border line of

punishability is adjudged to be passed. But, as has been said in reference to an every-day fact of nature, no one can say where twilight ends or begins, but there is ample distinction nevertheless between day and night. We think we can safely rely in this matter upon the intelligence of our juries, guided by the testimony of men who have practically made a study of the disease of insanity; and enlightened by conscientious desire, on the one hand, to enforce the criminal laws of the land, and, on the other, not to deal harshly with any unfortunate victim of a diseased mind, acting without the light of reason or the power of volition."

Judge Simmons was thirty years ahead of his brethren on the bench. What a tribute to the quality of his mind and the tenderness of his heart!

A number of our judges, especially those who have held the special criminal branch courts, are becoming exceedingly capable in identifying a defective defendant. The evidence in the case, his conduct or his appearance will inevitably give a clew to the experienced judge. The experienced probation officer or social worker is also relying upon the reports of the laboratory. The advanced workers come to the laboratory for a report as to the mental responsibility and possibilities of reforming their cases. For instance, a few months ago a young man 19 years of age was accused of murdering a woman. He has since been found guilty by a jury, and sentenced to hang which was modified to life imprisonment by the judge. This young man was in the Boys' Court two years previous to this crime and found to have a mentality of a child between 10 and 11 years. He had prior to that time been in the Juvenile Court. The director of the laboratory predicted to one of the judges, when the defendant was in on a minor charge, that he would become a serious offender. Our judge bound him over to the Criminal Court on a felony charge. The Criminal Court judge released him on probation, having no suspicion of the dangerous character of the boy. The fact that records are made, in many instances, before the crime, the findings are free from the suspicion of having been made to meet the emergencies of a particular case.

On September 30 last, a Greek shot two officers and felled another worker with a vicious blow on the head with a coffee pot, at the Congress Hotel in Chicago. The officers came to the Municipal Court Laboratory and found that he had been ex-

amined over a year previously and that his deportation to Greece had been recommended, as he was suffering from dementia praecox. The recommendation is now being carried out after the damage is done.

A certain woman came up for trial in the Morals Court. She had served 57 sentences in the bridewell, to say nothing of the many times she had been arrested and discharged. This woman had been suffering all these years from dementia praecox paranoides. She was committed from our court to the insane asylum, where she will get more appropriate care and treatment than in the bridewell. But for the laboratory this woman would be continuing to go back and forth to prison to the end of the chapter.

One day a man came up for trial in the Domestic Relations Court for failure to support a wife and five children. He had been arrested eighteen times and sentenced to the bridewell for the same offense more than a half dozen times. On this occasion he was sent to the laboratory and found to be a Cretin 10 3/5 years old. His wife was a Cretin 10 2/5 years old mentally. The five children were Cretins and all dwarfed. The children were put on thyroid donated by Armour & Co. The little girl especially is becoming more intelligent. Think of a court being engaged in this sort of business! This same man came up again, after he had been in the laboratory, before another branch court, the judge of which did not utilize the laboratory. He was again sentenced to the bridewell. The director of the laboratory got him out for Christmas.

One more illustration: A robbery occurred about three weeks ago, participated in by four men. The victim escaped, but one of the robbers shot another. The three living were brought to the laboratory and all were found to be feeble-minded. The one who did the shooting was nearly 11 years old mentally with dementia praecox grafted upon feeble-mindedness. The social worker for the Jewish Charities, who had seen many cases in the laboratory, on hearing that the youth who had done the killing was in the Boys' Court ante-room with fifteen or twenty other boys, stepped in the room and picked out the one who did the shooting. He had the characteristic blank stare of the Katatonic dementia praecox, by which she identified him as dan-

gerous. This case illustrates that the dangerous type of defective can be identified before he commits the crime instead of afterwards.

Here then is indicated the importance of identifying the mental defective in the public schools. The pupils of all schools should be gone over carefully by trained alienists and those behind grade for age more than three years should receive special attention. The defectives should be identified and protected so that they would not come in conflict with the law. Not long ago I visited the room for defective children in one of the public schools. The teacher who had worked patiently to teach her backward pupils said to me:

> "I understand their limitations. I worry nightly of what will become of these children when they leave my care. I fear their limitations will not be understood and that they will be sentenced to jail for crime. I would rest easier if I knew that they would be transferred from this school room to a farm colony, where they would be protected."

What then is the promise of the future? The feeble-minded situation as a whole is a hopeless one. Our only present methods of handling this situation are isolation and sterilization, since we realize more and more daily that the vast majority of these cases are of hereditary nature. However, the possible regeneration deserves some study for its possibilities, especially since, at the present time, the problem of isolating and controlling our large feeble-minded and psychopathic population is so gigantic. As for the treatment of the defective delinquents who get into the courts, the farm colony offers the one solution. The by-product of the manufacturing world has become almost an industry of itself, and this human by-product of the industrial and commercial world can in its turn be utilized to a very high extent in such colonies. The psychopath and dementia praecox case should be recognized at the earliest possible moment. The psychopath, the praecox case, when taken in the early years and given the proper training can undoubtedly be helped. The feeble-minded, especially the higher grades, which are more or less difficult to recognize in the early years, except by the expert, should be sorted out and new methods of training evolved.

The courts of our large cities must meet the responsibilities

thrown upon them by the discoveries in science by instituting psychopathic laboratories, so that the criminal defective may be identified. If followed by legislation permitting the segregation of the defective classes who need such care, we shall have made a substantial advance in controlling crime.

It will thus be seen that the findings of the laboratory are full of significance for neurology, psychiatry, psychology, ethics, and especially for criminology. The objective view of crime has heretofore prevailed in the United States; the laboratory emphasizes the personal side of the criminal and the subjective side of the crime. The slight advance made in the battle for the suppression of crime has been due to the fact that we have relied upon legislation prescribing penalties instead of doing what we should long ago have attempted—study the individual himself who commits crime. We have laid too great importance on the environmental factors and paid too little attention to the problem of heredity.

Where heredity plays a part as it does with the feeble-minded, insanities and psychopathic, the laws of eugenics must be invoked. Bad heredity creates a bad environment immediately, but it takes bad environment ages to create a bad heredity, if it does at all. After a generation or two of combatting crime, insanity and feeble-mindedness along these new lines, we shall find that these defective stocks will gradually disappear. The battle on mental deficiency and crime is as important as any the nation will wage.

In order to win the war against crime and mental deficiency, however, we must develop medical men who can lead. Large cities of the country, which are also medical centers, should lead the way in developing great teaching centers from which other cities might draw its experts. Here then is the opportunity and the duty of the medical profession, and of psychopathologists.

It is to be hoped that the federal government will do something in regard to the scientific study of unfortunates, especially the criminal classes. A bill has been introduced into Congress—Senate No. 4990 and House No. 8820—but Congress so far has been indifferent toward its passage. It carries a small budget of about $5,000. When it is considered that the burden of crime

and mental disease runs into many millions of dollars, when the whole nation is considered and that defectives are coming in with immigration, this paltry proposal discredits our intelligence. Besides conditions in Europe are such that a specal duty falls on us to carry on scientific research.

Prof. Svante Auhrenius, Director of the Nobel Institute, Stockholm, in acknowledging the receipt of the annual report of the Psychopathic Laboratory, said:

"I am very glad to see that the U. S. A. is proceeding rapidly on the rational and naturalistic line of jurisdiction instead of the old scholastic and formalistic which was regarded as the highest wisdom fifty years ago. I fear the U. S. A. will make such rapid progress in all branches of practical application of scientific methods that Europe will have been left in a great distance after this deplorable and cruel war and before the following time of depression has been overcome."

ALBANY HOSPITAL.

Fifteenth Report of Pavilion F, Department for Mental Diseases, for the Year Ending September 30,. 1917.

By J. MONTGOMERY MOSHER, M. D.,
Attending Specialist in Mental Diseases.

To the Board of Governors:

I have the honor to present the fifteenth report of Pavilion F, for the year ending September 30, 1917.

There remained in the Pavilion on October 1, 1916, twenty-two patients—fourteen men and eight women. There have been admitted two hundred and sixty-four men and one hundred and seventy-one women. The whole number of patients under treatment was, therefore, four hundred and fifty-nine.

There have been discharged four hundred and thirty-four patients—two hundred and sixty-nine men and one hundred and sixty-five women, and there remained in the Pavilion at the end of the year, eleven men and fourteen women.

The following tables show the forms of disease and the results of treatment for the year, and since the opening of the Pavilion:

TABLE I.—Showing the Forms of Disease and the Results of Treatment for the Year Ending September 30, 1917.

FORM OF DISEASE	Recovered		Improved		Unimproved		Died		Remaining		Total		Total
	M	W	M	W	M	W	M	W	M	W	M	W	
Acute delirium	3		1	2				2	1	3	5	7	12
Confusional insanity	1	1	4	7	6	14			1	2	12	24	36
Melancholia	1	1	6	11	7	17		1	1	2	15	32	47
Mania		1		4	5	6				2	5	13	18
Primary dementia	2	1	3	5	6	5			1		12	11	23
Recurrent insanity			1		2	4					3	4	7
Chr. delus. insanity			1		4	9			1		6	9	15
General paralysis			5		17	3	1		1		24	3	27
Terminal dementia			6	2	9	13	1		3	2	19	17	36
Idiocy and Imbecility			1	1	5	4					6	5	11
Alcoholic delirium	20	1	5	1	1		2				28	2	30
Alcoholism			68	11	2	1			1		71	12	83
Drug addiction			9	8	2					1	11	9	20
Ptomaine poisoning	1										1		1
Hypochondriasis			2		1						3		3
Epilepsy			3	4	2	3					5	7	12
Hysteria			1	11		1					1	12	13
Organic brain disease			1	1	5		4				10	1	11
Cerebral concussion	1										1		1
Locomotor ataxia			2		5	1		1			7	2	9
Meningitis								1				1	1
Chorea minor		1			1						1	1	2
Tuberculosis			3				5		1		9		9
Pneumonia	3						13				16		16
Organic heart disease										1		1	1
Paralysis agitans							1				1		1
Myelitis										1		1	1
Nephritis			1	1			2				3	1	4
Carcinoma								1				1	1
Septicaemia							1				1		1
Eclampsia				1								1	1
No diagnosis											4	2	6
Totals	32	6	123	70	80	81	30	6	11	14	280	179	459

TABLE II.—Showing the Forms of Disease and the Results of Treatment Since the Opening of the Pavilion, February 18, 1902.

FORM OF DISEASE	Recovered		Improved		Unimproved		Died		Remaining		Total		Total
	M	W	M	W	M	W	M	W	M	W	M	W	
Acute delirium	49	62	22	30	7	22	16	17	1	3	95	134	229
Confusional insanity	17	15	52	64	54	97	5	6	1	2	129	184	313
Melancholia	35	53	70	151	80	152	4	14	1	2	190	372	562
Mania	10	19	19	42	44	55	1	...	...	2	74	118	192
Primary dementia	8	9	42	29	77	47	1	...	1	...	129	85	214
Recurrent insanity	1	...	16	28	20	31	...	...	...	...	37	59	96
Chr. delus. insanity	...	...	4	7	60	65	...	1	1	...	65	73	138
General paralysis	...	...	15	1	84	15	5	...	1	...	105	16	121
Terminal dementia	...	...	58	44	180	151	41	26	3	2	282	223	505
Idiocy and Imbecility	...	...	26	17	55	49	1	...	...	...	82	66	148
Alcoholic delirium	320	19	45	8	6	2	41	2	...	...	412	31	443
Alcoholism	20	5	448	58	35	10	4	...	1	...	508	73	581
Drug addiction	18	13	52	43	11	6	3	5	...	1	84	68	152
Ptomaine poisoning	2	2	...	...	...	...	...	...	...	...	2	2	4
Nephritis	...	...	3	2	2	1	14	4	...	...	19	7	26
Eclampsia	...	1	2	1	...	1	...	1	...	...	2	4	6
Epilepsy	1	...	28	12	28	16	1	...	...	...	58	28	86
Neurasthenia	4	2	27	23	8	15	...	...	...	...	39	40	79
Hysteria	4	14	3	46	1	10	...	...	...	...	8	70	78
Chorea minor	1	2	1	1	2	1	...	...	...	...	4	4	8
Exophthalmic goitre	...	...	...	1	...	...	...	...	...	...	...	1	1
Tic douloureux	...	...	...	1	...	...	...	...	...	...	...	1	1
Hypochondriasis	1	...	18	...	7	...	1	...	...	...	27	...	27
Organic brain disease	...	...	18	11	31	7	20	11	...	...	69	29	98
Cerebral concussion	9	1	4	...	1	...	...	...	...	...	14	1	15
Oedema of the brain	...	...	...	...	1	...	1	...	...	...	2	...	2
Locomotor ataxia	...	...	5	3	6	2	...	2	...	...	11	7	18
Myelitis	...	...	...	...	1	1	...	2	...	1	1	4	5
Arthritis deformans	...	...	...	...	...	1	...	...	...	...	...	1	1
Meningitis	1	...	1	2	...	1	10	3	...	...	12	6	18
Multiple neuritis	...	...	1	...	...	1	...	...	...	...	1	1	2
Paralysis agitans	...	...	...	...	2	1	3	...	...	...	5	1	6
Hydrophobia	...	...	...	...	...	...	1	...	...	...	1	...	1
Tetanus	...	...	...	...	...	...	1	...	...	...	1	...	1
Tuberculosis	...	...	8	...	3	1	31	5	1	...	43	6	49
Typhoid fever	3	1	...	...	...	...	...	...	...	...	3	1	4
Liver disease	...	3	...	...	...	...	2	1	...	...	2	4	6
Pneumonia	6	...	...	...	...	...	25	3	...	...	31	3	34
Heart disease	...	...	4	1	2	...	8	...	...	1	14	2	16
Pernicious anaemia	...	...	...	1	...	...	...	1	...	...	...	2	2
Chlorosis	...	...	...	...	...	...	...	1	...	...	...	1	1
Septicaemia	...	...	...	...	...	...	2	1	...	...	2	1	3
Gastro-enteritis	...	...	...	...	...	...	1	...	...	...	1	...	1
Fracture of skull	...	...	...	1	2	...	5	1	...	...	7	2	9
Multiple fibromatosis	...	...	...	...	...	...	...	1	...	...	...	1	1
Carcinoma	...	...	...	...	3	...	...	1	...	...	3	1	4
Strangulated hernia	...	...	...	...	...	...	1	...	...	...	1	...	1
Pleurisy	...	...	1	...	...	...	...	1	...	...	1	1	2
Malingering	...	...	...	...	1	...	...	...	...	...	1	...	1
Insolation	1	...	...	...	...	...	...	...	...	...	1	...	1
No diagnosis	...	...	...	...	...	...	...	...	...	...	31	20	51
Totals	511	221	993	628	814	761	249	110	11	14	2609	1754	4363

A study of the patients, shown superficially in the tables, is important in its demonstration of the frequent occurrence of mental symptoms in the course of general diseases, for relatively few come within a strict interpretation of the term "insanity." This arises in part from the accessibility of the Pavilion to the other wards of the hospital, to other hospitals in the vicinity and to the community at large. It is found much more convenient and effective to place the patient who is in a state of delirium or shock from some fever or accident in a ward equipped for the emergencies of mental manifestations, than to attempt treatment under the disadvantages of an extemporized and incomplete service at home. This liberal interpretation of the causes of mental disorder does much to obliterate any definite line of distinction of insanity, and leads to a more generous conception of the status of its victims. There is undoubtedly a class of individuals equipped with structurally defective brains, not susceptible of development beyond their natural capacity. In the lowest grades there is no mind at all, and from this hopeless condition of idiocy to the higher degrees of cranks and paranoiacs, all stages of inefficiency are met. The accompanying inability to meet the requirements of society produces a group of "aliens," who must be sequestrated for safety and for the common good. Their tendencies are often criminal, and their lower state of intelligence and of morals is frequently associated with peculiar and sometimes repulsive physical characteristics, the outward and visible signs of the immature and degraded faculties of thought within. There is little hope of improvement of such conditions and any enthusiasm for the rehabilitation or reconstruction must be left to the social reformer and not to the physician who cannot abandon his faith in anatomical facts.

The problems of penology are not within the province of this report, but statement of the proposition is rhetorically justified that the way may be cleared for the subject which more nearly concerns our work. We cannot too often or too strongly emphasize its purely medical character, and the futility of any endeavor to creat intelligence where none existed before. The hospital deals with diseases only, and mental disease implies the existence of mind which has become disordered through some pathological

process. Here restoration may be sought, and no means known to science should be neglected in the seeking. The simple and the vicious having been eliminated from consideration, the mental patient may be further accredited as entirely innocent of wrong-doing, and in fact, the great number become such from excess of virtues, and disregard or ignorance of the laws of health. Too often "overwork" and "worry," are the assigned causes of sickness, and the sad tale of privation, tribulation and misfortune figures so prominently as to become an almost stereotyped history of the attack.

The causes and the symptoms are characteristic in each of the three periods of life. In youth the emotional instability is not only the origin of the disease but the explanation of its manifestations. The phenomenal activity of the developmental years, the quick impulse to act upon the thought, disregard of consequences, uncontrolled expenditure of energy, contempt of convention, "sublime audacity of faith," which would remove mountains,

> "And with ambitious feet, secure and proud,
> Ascend the ladder leaning on the cloud,"

excite the wonder and amazement of all who observe the attributes of fickle and wayward youth. "No danger daunts it, and no foe withstands." And when the crash comes inconsistency of effort with purpose is revealed in exaggerted form: loss of co-operation between the will to act and the power to accomplish. The underlying, essential state is one of inertia, lasting days, weeks or months. There is little or no evidence that the patient gives attention to his surroundings, and yet, after recovery, it is found that observation and memory have been complete. In the apparently lethargic period sudden, unexpected, purposeless and unpremeditated outbreaks of violence or passion occur. Often a visible effort at reasonable action is shown, and the result is perverted, misdirected, ineffective and apparently contrary to the desire of the patient. The conclusion is inevitable that the disarrangement of the cerebral mechanism prevents the correct distribution and direction of the currents of nervous energy; and it is equally certain, and too great emphasis cannot be laid upon this, that the mind is not destroyed, but temporarily out of adjustment. The patient is conscious of his surroundings and of the

world without, more or less anxious to express his desires and to preserve his associations, without the power to free himself from his isolation. The medium of communication between his thoughts and his environment is disorganized and ineffective, and he is protected only by those who may interpret the wishes he endeavors so vainly to express.

In the words of Peter Grimm who is depicted on the stage in the attempt to convey messages from the next world to this, he "cannot send them across." This disorganization of the mental mechanism is functional and is due to the overuse of delicate tissues; it means exhaustion and is susceptible of correction. For the student or the clerk or the enterprising business man, whose ambition has overmastered his discretion, restoration follows a prolonged period of rest, and recovery is to be expected. The custom of medical practice to reduce all combinations of morbid symptoms to a phrase, and to sum up in a diagnostic word a complicated pathological condition is not always serviceable in mental pathology, where the whole existence of the patient, his personality, character and temperament are involved, and the attempt to so designate each case has often proved embarrassing. A German alienist, Professor Kraepelin, some years ago, applied to these adolescent cases the term "demetia praecox," and stamped them with incurability. The value of this conception lay in the world-wide attention it attracted which directed scientific thought to the adolescents as a class. The results, however, have not sustained the Teutonic dictum.

In Professor Kraepelin's clinic at Munich, the statistics from year to year show a decreasing number of cases and the rather lame excuse was offered that so many recoveries had taken place that the diagnosis was revised. This was in spite of the fact that the symptoms upon which the diagnosis was based, remained constant. In the meanwhile the proselytes to the Munich idea are without the faith of their adoption.

Thus through a study of years and the observation of a great number of cases there has come not only a more substantial knowledge of the significance of these attacks, but a fairly clear conception of their origin and of the means of relief. There are also suggestions for prevention, and the restored patient returns

to his normal life with a better idea of his resources and of conduct which will insure against repetition. This educational value of the hospital experience is even more eagerly grasped by the patients of more advanced years. The maladies of middle life or maturity are represented by errors of judgment. The age is that of discrimination and reason, and exhaustion of the brain is followed by delusions of a depressing nature. The inability to concentrate attention, resulting from fatigue, diminishes or destroys the executive capacity, and the bewildered and discouraged merchant or artificer, as his grasp weakens, not unnaturally anticipates disaster, even though he appreciates its cause. He is particularly conscious of mental failure, appearing to him as a vague and threatening doom. From his apprehensions arises a series of suspicions easily elaborated into delusions, and, after a period of forced self-control, the crisis is reached in a sudden explosion, in which despair, anguish, fear and other exaggerated forms of sentiment are mingled with morbid fancies, the whole presenting a state of confusion not infrequently attaining the violence of delirium. Or in a more gradually developing process profound melancholia with suicidal impulses shows none the less forcibly how great the tension to which the mind has been subjected. Very often, perhaps usually, disaster may be attributed to aspirations inviting to success and power beyond the personal ability; sometimes, however, compassion is aroused for the misfortunes and trials which baffle endeavor and defeat the hopeless task. Many a man is forced

> To bend down to the work, to bare the breast,
> And struggle, feet and hands, with enemies;
> To buffet and to battle with hard men,
> With men of selfishness and violence:
> To watch by day and calculate by night,
> To plot and think of plots, and through a land
> Ambushed with guile, and with strong foes beset,
> To win with art safe wisdom's peaceful way.

Here the hospital performs its temporary service, and, as reason gradually resumes its throne, assumes its educational function, unfolds and demonstrates the errors contributing to the disaster and sends out the patient with renewed hope and better knowledge of the limitations within which his conduct must be controlled.

It may be seen at once that these calamities of life go far beyond the resources of any simple clinical terminology; or of faith in the pharmacopoeia and the power of drugs. The need of the patient is for sympathy and for understanding of the forces, which, resist them as he may, carry him, uncontrolled and uncontrollable, far beyond his purpose. This is the demand to which the hospital attempts to respond, and when there are errors, consoles itself with the reflection that they are those of judgment and not of design, for the problems are difficult and sometimes insoluble. Fifteen years of effort have given reasonable return, and too much praise cannot be given to the nurses, who are the strength of the service, and to the hospital organization which endeavors to respond to high ideals of medical practice and faith.

We turn from this legitimate and charitable field of duty to the consideration of another class of patients: the incorrigibles. In the distressing struggle for existence, bringing so much suffering in its train, it appears incredible that human strength may be voluntarily dissipated and efficiency destroyed. But the alcoholics and users of drugs persist in their demoralizing practices. The effects of alcohol are quickly overcome, and prostration threatening a fatal result infrequently disappears with surprising rapidity. Possibly this repeated challenge establishes confidence, and promises of abstention after critical indulgence are not kept when temptation assails the moral weakness anew. But the debauch is finally complicated by some incidental disease and all efforts are powerless. This is particularly so with pneumonia. The tabulation of pneumonia refers to cases of delirium tremens and the combination of pneumonia and alcoholism, even in a man of rugged physique, means death.

The drug addicts may be divided into two groups, those who indulge for temporary sensual gratification and excitement, and those who are incidentally led into the habit for relief of suffering. There are cases of neuralgia from various causes, of malignant disease and other ailments, in which the suffering justifies the use of opium; otherwise, life would be intolerable: in fact, suicide is recognized as a possibility in cases of tic douloureux, that frightful neuralgic condition of the face. For those who seek

dissipation there is little to be done. They appear to constitute a low and vicious type. Experience has been that the vice is inherent and natural, and is not corrected by removal of the drug. Both federal and state authorities are now active in efforts at suppressing an illegal traffic, but there remains a reasonable doubt that reform of individual tendencies will follow. The cure of the morphine habit has long had medical attention, and custom has sanctioned the gradual reduction of the dose. This takes time and has caused a long, tedious and uncomfortable experience for the patient. After guarded trial in promising cases, it has been found that the drug may be discontinued at once, and opium and its alkaloids are not now given in this department unless some physical complication gives warning. For three or four days the patient from whom the drug is taken is exceedingly uncomfortable. There are active digestive disturbances, the pulse rate descends, sometimes as low as forty, and the nervous system appears entirely disorganized. There is no sleep, restlessness and motor activity are constant, and subjective sensations are said to be indescribable. After three or four days, during which the pleas for relief are almost beyond resistance, the symptoms subside, and gratitude is expressed that the severe ordeal is past, and that there is no more distress ahead. Palliative drugs are used, and the sedative hyoscin has some value. Strychnine is also given for stimulation, and otherwise an expectant attitude is taken.

Another poison whose ravages of the nervous system are subtle and destructive is that of syphilis. It has long been thought that syphilis of the brain, resulting in the disease known as general paralysis, or paresis, was necessarily fatal within a short time—two or three years. There has seemed to be a distinction between paresis and other forms of syphilitic brain disease and the existence of an unknown late product of the infection was invoked in explanation of this apparent inconsistency. The discovery of the organism of syphilis in the brains of paretics has led to revision of this theory, and it is now believed that all cases are due to this organism. Differences in the course of the disease, recoveries in some, intermissions in others, are under consideration and it is possible that histological and bacteriological research

will eventually explain this phenomenon. Be that as it may, the administration of active antisyphilitic treatment in all cases is indicated, and followed occasionally by beneficial results.

It thus appears that the mental affections of youth and mature life are largely due to exhaustion of the nervous system, and that in the latter period occur conditions brought about by specific poisons, of which alcohol and drugs are voluntarily abused, and syphilis is more or less innocently acquired. Upon these various cases the work of the Pavilion is legitimately expended. There are in addition many cases of pathological old age, which may be regarded as a degenerative condition incident upon the gradual disintegration of the brain. In spite of this structural disorganization, the pathological states of old age deserve consideration, and unpleasant conditions are often relieved. This is due again to the effects of routine and the quiet regularity of hospital life, with consideration of the personal characteristics incident upon a peculiar loss of memory, and attempts to adjust the present with conditions of the past. Many cases of advanced age come to the hospital because of the want of comprehension of their condition and many return home in an improved state.

The tabulated statistics include a large number of common diseases which, on the surface, have no claim upon this department. It may be explained that in these cases there has been a mental complication of the nature of delirium or stupor or some disability or helplessness which the general wards are unprepared to meet. In this respect the Pavilion has relieved the hospital and has been able to extend the scope of its usefulness.

In conclusion, a simple classification of mental affections may be given as a summary of the demands made upon the hospital, as follows:

1. Mental disorders of adolescence, arising from exhaustion;
2. Mental disorders of maturity, arising
   (a) from exhaustion,
   (b) from intoxications;
3. Mental disorders of old age, arising from degeneration;
4. Mental disorders incidental to physical disease.

To these groups may be added that of mental defects, individuals born with limited capacity for development of whom there

are, (I) idiots or imbeciles; (II) the insane, paranoiacs, or others who have failed to reach normal standards. For these there is no prospect of relief, and medical care is desirable in so far as it provides educated and intelligent custody. The last, rather anomalous group consists of those unexplainable instances of so-called recurrent insanity, in whom attacks of abnormal mental action occur at regular intervals through life. They may seek admission to this hospital, and, under its ministrations, pass through the pathological period.

Discharges

Of the four hundred and thirty-four patients discharged, thirty-eight recovered and one hundred and ninety-three were improved. The percentage of cases distinctly benefited is fifty-three. Since the opening of the Pavilion the percentage of cases discharged as recovered and improved has been fifty-four. Of the forty-three hundred and sixty-three patients admitted in fifteen years, twenty-three hundred and fifty-two patients have returned to their homes with health restored. One hundred and sixty-one patients were discharged unimproved, and thirty-six died. The causes of death were: exhaustion of alcoholism, one; tuberculosis, five; pneumonia, thirteen; organic brain disease, four; nephritis, two; meningitis, three; heart disease, one; diabetes, one; general paralysis, one; paralysis agitans, one; exhaustion, two; septicaemia, one; carcinoma, one.

Acknowledgment

It is a pleasure to record from year to year the harmonious relations existing between the hospital and the public officials of the city and county. Public patients are received under order of the Commissioner of Charities, and to the incumbent of that office, Hon. Alwin C. Quentel, and his associates we are indebted for the care and courtesy invariably extended in solving the frequently troublesome problems of admission and discharge.

The following gifts have been received during the year: Billiard cue from Dr. G. H. Gorham, magazines from Mrs. Walter R. Marden, framed pictures from Mrs. Clark G. Richards and Mrs. William B. Jones, scrap books from Mrs. Jones, containing a fine collection of views of Albany, and subscription to McClure's Magazine, which has had the usual renewal by a friend and former patient, to all of whom thanks are given.

Public Health

Edited by Arthur Sautter, M. D.

Department of Public Safety, Bureau of Health, Albany, N. Y.

Bureau of Vital Statistics.

Compiled by William F. Fullgraff, Registrar.

Deaths for Month of September, 1917.

Consumptions	25	Broncho Pneumonia	2
Typhoid Fever	1	Bright's Disease	4
Scarlet Fever	0	Apoplexy	4
Measles	0	Cancer	15
Whooping Cough	0	Accidents and Violence	15
Grippe	0	Deaths under 1 year	26
Diarrheal Diseases	13	Deaths over 70 years	31
Diphtheria and Croup	0	Death rate	17.03
Pneumonia	5	Death rate less non-residents	14.60

Deaths in Institutions.

	Non Res.	Res.		Non Res.	Res.
Albany Hospital	4	8	St. Margaret's House	3	0
Albany Hospital Camp	2	8	Infants' Home	1	0
Albany County Hospital	3	0	Home for the Aged	0	2
Federation of Labor Camp	0	1	Hospital for Incurables	2	3
Homeopathic Hospital	2	10	Public Places	3	7
St. Peter's Hospital	4	7		24	46

Births	195	Still births	4

Bureau of Communicable Disease.

Cases reported during September, 1917.

Typhoid Fever	13	Whooping-cough	6
Scarlet Fever	0	Tuberculosis	25
Diphtheria and Croup	1	Anterior Poliomyelitis	1
Chickenpox	4		
Smallpox	0	Total	57
Measles	7		

Number of days quarantine for diphtheria:
Longest..... 11 Shortest..... 11 Average..... 11

Fumigations: Houses..... 21 Rooms..... 124

Milk bottles disinfected 6

Communicable Disease in Relation to Schools.

St. Joseph's Academy 1

TUBERCULOSIS.

Nurses' Report.

Living cases on record September 1, 1917		789
Cases reported:		
By card	21	
Dead cases by certificate	4	25
		814
Dead cases previously reported	23	
Dead cases not previously reported	4	
Removed	6	33
Living cases on record Oct. 1, 1917		781
Total tuberculosis death certificates		27
Non-resident deaths:		
Albany Hospital Camp	2	
City at large	2	4
Resident deaths		23

Visits to Cases of Communicable Disease.

Tuberculosis	2
Miscellaneous	43
Visits to physicians	4

BENDER LABORATORY REPORT.

Diphtheria.

Initial positive	1	Suspicious	2
Initial negative	167	No growth	2
Release positive	0		
Release negative	4	Total	176

Sputum for Tuberculosis.

Positive	23	Negative	77
			100

Widals.

Positive	7	Wassermann tests	116
Negative	13	Milk analyses	129
Suspicious	3	Water analysis	1
Total	23		

Bureau of Nuisances.

Complaints made	40	Reinspections	44
Inspections	33	Plumbing	11
Plumbing	10	Sanitary	23
Sanitary	23		

Hearings.

Cases heard before health officer 2

Class of Cases.

Smoke	1	Privy vault	1

Disposition of Cases.

Abated 2

Bureau of Plumbing, Drainage and Ventilation.

Inspections	152	New buildings	15
Old houses	66	Houses tested	18
New houses	86	Water tests	18
Permits issued	82	Houses examined	12
Plumbing	66	Re-examined	65
Building	16	Valid	8
Plans submitted	22	Without cause	4
Old buildings	7		

Dead Animal Report.

Horses removed	21	Cats removed	313
Dogs removed	177		
		Total	511

Bureau of Markets and Milk.

Public market inspections	19	Milk depots inspected	12
Market inspections	18	Stores inspected	64
Fish market inspections	2	Milk houses inspected	43
Lactometer readings	163	Milk cans inspected	2246
Temperature readings	163	Dairies inspected	43
Fat tests	77	Cows examined	677
Sediment tests	56	Cows quarantined	4
Chemical tests	43	Complaints investigated	2
Bacterial counts	77		

MISCELLANEOUS.

Cards posted for contagious disease	7	to children	22
Cards removed	7	Vaccinations	251
Notices served on schools	56	Cases assigned to health physicians	45
Notices served on stores and factories	3	Calls made	71
Postal card returns sent to doctors	7	Garbage collected from 1st District	bbls. 593
Postal card returns received from doctors	7	Garbage collected from 2d District	bbls. 605
Inspections and reinspections	12	Garbage collected from 3d District	bbls. 648
Employment certificates issued			

Medical News

ALBANY GUILD FOR THE CARE OF THE SICK.—DEPARTMENT OF VISITING NURSING.—STATISTICS FOR JUNE-SEPTEMBER, 1917.—Number of new cases, 491. Classified as follows: Dispensary patients receiving home care, 11; district cases reported by health physicians, 11; charity cases reported by other physicians, 91; moderate income patients, 226; metropolitan patients, 152; old cases still under treatment, 39; total number of cases under nursing care during months, 530. Classification of diseases for the new cases: Medical, 95; surgical, 32; gynecological, 9; obstetrical under professional care—mothers 172, infants 156; eye and ear, 6; skin, 1; throat and nose, 0; dental, 0; infectious diseases in the medical list, 18; surgical list, 2. Disposition: Removed to hospitals, 5; deaths, 18; discharged cured, 354; improved, 68; unimproved, 52; number of patients still remaining under care, 33.

Special Obstetrical Department.—Number of obstetricians in charge of cases, 4; students in attendance, 1; nurses in attendance, 5; patients carried over from May, 1; new patients during month, 12; patients discharged, 13; visits by head obstetrician, 0; by attending obstetrician, 79; by students, 2; by nurses, 109. Total number of visits for this department, 190.

Visits of Guild Nurses (all departments).—Number of visits with nursing treatment, 2,999; for professional supervision of convalescents, 1,106; total number of visits, 4,105; visits to pay cases, 2,429; to charity cases, 570; to unrecorded cases, 1,116; cases reported to the Guild by 3 health physicians, and 94 other physicians; graduate nurses, 3; pupil nurses, 2 on duty; certified nurses, 2; substitute nurses, 2.

Dispensary Report.—Number of clinics held, 313; new patients, 391; old patients, 1,357; total number of patients treated during months, 1,748.

Classification of clinics held: Surgical, 47; nose and throat, 30; eye and ear, 61; skin and genito-urinary, 24; medical, 34; prenatal, 10; lung, 22; dental, 0; nervous, 15; stomach, 9; children, 31; gynecological, 30.

New York Skin and Cancer Hospital.—The Governors of the New York Skin and Cancer Hospital announce that Dr. L. Duncan Bulkley, assisted by the attending staff, will give the nineteenth series of clinical lectures on diseases of the skin in the Out-Patient Hall of the Hospital, on Wednesday afternoons, beginning November 7, 1917, at 4:15 o'clock. The lectures will be free to the medical profession, on the presentation of their professional cards.

Medical Review of Reviews.—At about the time that the *Medical Review of Reviews* was founded, Professor Dillon Brown, of New York, established a semi-monthly journal devoted to the diseases of children, called *Pediatrics*. The opening article was by A. Jacobi and the leading physicians of the city, among them, J. Lewis Smith, Reginald H. Sayre, and William H. Park, contributed to its pages. Latterly it has been edited by William Edward Fitch, but Dr. Fitch has recently been appointed a Major in the United States Army.

Pediatrics will no longer appear as a separate publication, but has been incorporated with the *Medical Review of Reviews*. Beginning with January, however, the *Medical Review of Reviews* will contain a special department devoted to Pediatrics. This feature is but one of the improvements scheduled for the coming year. Important Symposia are now in progress, the Editor will contribute a second series of Pathfinders in Medicine, a Staff of Associate Editors is being formed, and thus the *Medical Review of Reviews*, in entering upon its twenty-fourth annual volume, promises to be more valuable to the profession than ever before.

"Well Recognized Medical Schools."—The Surgeon-General of the United States has announced that a medical school recognized generally by state examining boards will be considered as a well recognized medical school, which is one legally authorized to confer the degree of Doctor of Medicine, and is recognized by at least fifty per cent of the states of the Union by their licensing boards for the practice of medicine, and an institution which gives the first two years of the medical course will be recognized if its students after completion of these two years are eligible to admission to the third year of a well recognized medical school. Students of these schools will be recognized from exemption for draft, and this ruling applies to the students of the Albany Medical College.

The Senior Military Medical Association.—The purpose of the Association is to serve the government by performing such medical work as the members are capable of, especially at or near the member's residence.

Its members mostly can do only part-time work, but some are able to go from home and do full-time service. The arrangement will probably be a contract with the government to do special service, with a military grading. The pay will be according to the grading and work performed.

It is felt that the members of the association can act as consultants in general and special physical conditions of recruits and conscripted men; also, in matters of sanitation and hygiene, and in making general physical examinations and mental and special examinations and in working in local hospitals or established places or cantonments where the sick or injured men may be sent; or those where fitness may be brought about in men medically rejected from admission to the service; also in performing any other work they may be capable of by the direction of the government.

No assurance can at present be given as to when service may be requested. Men may apply for admission to the S. M. M. A. by filling out the blank card which will be supplied upon request to Dr. Alexis Dupont Smith, and returning it properly filled out and one dollar, the annual dues made necessary to cover postage and incidental expenses.

For the present, residential limit of eligibility for membership includes Pennsylvania, New Jersey, Delaware, and Maryland. When points remote from Philadelphia have organized units or branches of the S. M. M. A., membership may be transferred.

The membership now numbers several hundred, whose loyalty has impelled them to offer such service as they can perform for their country, now in the time of its need.

Medical Service of the Army and Navy.—Dr. Arthur Krida (A. M. C. '11), of Schenectady, N. Y., has been commissioned as first lieutenant in the Medical Reserve Corps.

—Dr. Andrew MacFarlane (A. M. C. '87), of Albany, N. Y., with rank of major, has been ordered for duty as chief of the medical service at Camp Funston, Kan.

—Dr. Minas S. Gregory (A. M. C. '98), who has been commissioned a major in the Medical Reserve Corps, has been ordered to Fort Niagara, N. Y., for the purpose of making examinations of student officers in psychiatry, and at the completion of this duty to return to his station at Plattsburgh Barracks, N. Y.

—Dr. Ward W. Millias (A. M. C. '12), of Rome, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered to the Neurological Institution in New York City for a course in the specialty of nervous diseases.

—Dr. James H. Reed (A. M. C. '67), of Saugerties, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for duty at Fort Benjamin Harrison, Indianapolis, Ind.

—Dr. Roy J. Marshall (A. M. C. '10) of Rome, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for duty at Fort Benjamin Harrison, Indianapolis, Ind.

—Dr. Byron G. Shults (A. M. C. '15), of Johnstown, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for instruction to Fort Benjamin Harrison, Indianapolis, Ind.

—Dr. Arthur H. Wheeler (A. M. C. '12), of Troy, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for instruction to Fort Benjamin Harrison, Indianapolis, Ind.

—Dr. John P. Faber (A. M. C. '05), of Schenectady, N. Y., has received his commission as captain in the Medical Reserve Corps, and has been ordered for duty as tuberculosis specialist and assistant to the Army Medical Staff at Camp Lee, Petersburg, Va.

—Dr. Nelson K. Fromm (A. M. C. '08), of Albany, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered from Walter Reed General Hospital for duty as tuberculosis specialist and assistant to the Army Medical Staff at Camp Custer, Battle Creek, Mich.

—Dr. John L. Hemstead (A. M. C. '16), of Waterford, N. Y., has been commissioned as lieutenant in the Medical Reserve Corps and is stationed at Fort Slocum, N. Y. Dr. Hemstead has written regarding his work which consists, at the present time, in the examination of recruits, the number examined being about two hundred a day, and outgoing troops are examined and sent to various posts throughout the country. Dr. Hemstead is now engaged in cardiac examinations, men being assigned to different portions of the examination. The hospital contains two hundred beds and a laboratory, and it is expected that Dr. Hemstead will be placed in charge of the laboratory.

—Dr. Garrett M. Clowe (A. M. C. '13), of Schenectady, N. Y., has received his commission in the Medical Reserve Corps, and has been ordered for duty to Fairfield, O.

—Dr. John D. Gulick (A. M. C. '12), of Schenectady, N. Y., has received his commission as captain in the Medical Reserve Corps, and has been ordered for duty to Fort Ethan Allen, Vt.

—Dr. John F. Southwell (A. M. C. '10), of Albany, N. Y., who has received his commission as captain in the Medical Reserve Corps, has been ordered to the Albany Hospital and Medical College for the purpose of recruiting Base Hospital No. 33.

—Dr. George P. Coopernail (A. M. C. '00), of Bedford, N. Y., who has received his commission as captain in the Medical Reserve Corps, has been ordered for duty to Fort Benjamin Harrison, Indianapolis, Ind.

—Dr. Jesse M. W. Scott (A. M. C. '96), of Schenectady, N. Y., has received his commission as captain in the Medical Reserve Corps, and has been ordered for duty to Petersburg, Va.

—Dr. Garrett W. Timmers (A. M. C. '97), of Castleton, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for duty to Fort Ethan Allen, Vt.

—Dr. Clarence L. Sicard (A. M. C. '01), of Amsterdam, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for duty to Little Rock, Ark.

—Dr. Edward L. Hanes (A. M. C. '99), of Rochester, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered to Washington Barracks, D. C., to make examinations in psychiatry.

—Dr. Ray M. Eaton (A. M. C. '11), of North Adams, Mass., who has received his commission as lieutenant in the Medical Reserve Corps, has arrived in England on his way to France where he will take charge of one of the field hospitals behind the battle line.

—Dr. Thomas M. Holmes (A. M. C. '09), of Delmar, N. Y., who left for France in July with commission as first lieutenant in the Medical Reserve Corps, has been transferred to the 142d British Field Ambulance Co., and is now chief surgeon of the unit.

—Dr. John E. Burke (A. M. C. '15), of Schenectady, N. Y., has received his commission as first lieutenant in the Medical Reserve Corps,

—Dr. Clarence F. Graham, instructor in the Albany Medical College, has received his commission as first lieutenant in the Medical Reserve Corps.

—Dr. Charles A. Perry (A. M. C. '14), of West Leyden, N. Y., has received his commission as first lieutenant in the Medical Reserve Corps.

—Dr. James I. Schoonmaker (A. M. C. '14), of West Coxsackie, N. Y., has received his commission as first lieutenant in the Medical Reserve Corps.

—Dr. John J. Beard (A. M. C. '97), of Cobleskill, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been assigned to duty as assistant to the chief of the medical service at Camp Funston, Fort Riley, Kansas.

—Dr. Gilbert W. Crissey (A. M. C. '99), of Mechanicville, N. Y., has received his commission as captain in the Medical Reserve Corps, and has been ordered for duty as a member of the board of medical officers for tuberculosis examination to Camp Logan, Houston, Texas.

—Dr. Theodore S. West (A. M. C. '16), who recently completed his interneship in the Albany Hospital, has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered to Cornell Medical College, New York City, for a course of instruction in military roentgenology.

—Dr. Conrad A. Rissberger (A. M. C. '13), of Albany, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered to Fort Oglethorpe, Ga.

—Dr. Emanuel M. Freund (A. M. C. '16), of Albany, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for duty with the 302d Stevedore Regiment at Newport News, Va.

—Dr. Thomas W. Salmon (A. M. C. '99), major, has been ordered to New York City and other towns to inspect hospital sites, thereafter to report in person to the General Surgeon of the Army at Washington, D. C.

—Dr. John L. Edwards (A. M. C. '12), of Hudson, N. Y., has received his commission as lieutenant in the Medical Reserve Corps, and has been ordered for three weeks' intensive training to Washington University, St. Louis, Mo.

—Dr. Lawrence J. Early (A. M. C. '15), of Albany, N. Y., first lieutenant in the Medical Reserve Corps, has sailed for England.

—Dr. Abraham M. Rabiner (A. M. C. '16), lieutenant, after ten weeks' military training at Fort Benjamin Harrison, has been ordered to Ann Arbor, Mich., for intensive training in neuro-psychiatry. Dr. Rabiner, while an interne at the Albany Hospital, showed a great deal of interest in this subject when on duty in Pavilion F. The work at Ann Arbor is directed by Dr. Barrett at the State Psychopathic Hospital. The men in this section also receive instruction at the University Hospital by Dr. Camp in neuro-pathology and neurology, and from Dr. Canfield in neuro-otology. They are also receiving instruction in the various methods used for the determination of mental deficiency.

Personals.—Dr. Edgar A. Vander Veer (A. M. C. '98), presented a communication on "Carcinoma in the Stump of the Cervix Following Suprapubic Hysterectomy" at the Thirtieth Annual Meeting of the American Association of Obstetricians and Gynecologists, held at Newark, N. J., September 17, 18 and 19, 1917.

—Dr. Douglas C. Moriarta (A. M. C. '85), of Saratoga Springs, N. Y., presented a communication entitled "Radium; Further Clinical Observations," at the Thirtieth Annual Meeting of the American Association of Obstetricians and Gynecologists, held at Newark, N. J., September 17, 18 and 19, 1917.

—Dr. Meyer L. Rhein (A. M. C. '80), of New York City, presented a paper on "The Retention of Devitalized Teeth Without Danger of Focal Infection," before the Section of Stomatology at the Sixty-Eighth Annual Session of the American Medical Association, held in New York in June, 1917. Dr. Rhein's paper is published in the *Journal of the American Medical Association* of September 22, 1917.

—Dr. Arthur F. Holding (A. M. C. '01), and Dr. William Bayard Long, of New York, publish a paper on "The Truth About Radioactive Therapy in Malignant Growths" in the *Journal of the American Medical Association* of September 22, 1917. This paper was read before the Section on Pharmacology and Therapeutics at the Sixty-Eighth Annual Session of the American Medical Association held in New York in June, 1917.

—Dr. Albert Vander Veer (A. M. C. '62, of Albany, N. Y., publishes a paper entitled "Progress in Surgical Therapeusis" in the *Medical Record* of September 22, 1917. This paper was read by title at the

Eighteenth Annual Meeting of the American Therapeutic Society at New York, held June 1, 1917.

—Dr. Frank E. Deeds (A. M. C. '14) is in practice at Akron, Ohio. Dr. and Mrs. Deeds announce the birth of a daughter on September 29, 1917.

Married.—Dr. Arthur Wells Elting, Professor of Surgery in the Albany Medical College, and Mrs. Harriet Corning Rawle, of Bryn Mawr, Penn., were married on October 24, 1917. After a wedding trip in the South Dr. and Mrs. Elting will return to Albany. Dr. Elting will continue his practice and his classes in the College until the Base Hospital at Albany, of which he is the chief, with rank of major, is ordered to the front.

Died.—Dr. Thomas L. Deveny (A. M. C. '01), of Watervliet, N. Y., died at St. Peter's Hospital, Albany, October 24, 1917, as the result of an automobile accident. Dr. Deveny practiced in Watervliet after graduation. He is survived by his wife and three children.

—Dr. John L. Schoolcraft (A. M. C. '79), died at his home in Schenectady, N. Y., October 23, 1917, after an attack of cerebral hemorrhage. Dr. Schoolcraft was ill less than two days. He was sixty-three years of age. Dr. Schoolcraft was a descendant of one of the oldest families of Schenectady and has practiced in that city since his graduation. He was educated in the Schenectady schools and Union College, and was health officer in 1914 and 1915. He leaves a widow.

Current Medical Literature

REVIEWS AND NOTICES OF BOOKS.

The Fundus Oculi of Birds Especially as Viewed by the Ophthalmoscope. A Study in Comparative Anatomy and Physiology. By Casey Albert Wood, M. D. Illustrated by 145 drawings in the text; also by sixty-one colored paintings prepared for this work by Arthur W. Head, F. C. Z., London. Chicago, The Lakeside Press, 1917. Price $15.

This remarkable book is very interesting—especially, of course, to students of ophthalmology, ornithology, comparative anatomy and physiology or zoölogy.

Its vast potential value is best appreciated by an ophthalmoscopist who studies it in the light of Darwin's splendidly logical work, "The Origin of Species."

The field for investigation is enriched by the fact that the visual acuity of birds is as keen as is known to obtain among vertebrates. The author says that it is often possible to recognize a species by viewing its fundus

oculi. The possible value of that fact must be great. Viewed in the light and spirit of Darwin's work, its importance bulks very large. The correspondence of the fundal features with the birds' habits, habitat, means of obtaining food, of escaping from enemies, of migration and reproduction, show how intense may be the interest of such study. As is stated by Dr. Wood, in the summary of conclusions: "In future no report upon a particular avian species can be held complete that ignores the visual apparatus and especially the appearance of the fundus oculi as shown by the ophthalmoscope."

In view of the fact that domesticated or any other than live, wild birds, just caught or winged, could not properly be used for most of the ophthalmoscopic examinations, from which the illustrations result, the amount of work involved, in the production of the pictures, was obviously of prodigious amount.

The work of the printers and binders is admirable and the book one that many a scientist will rejoice to own. C. M. CULVER.

International Clinics. A quarterly of illustrated clinical lectures and especially prepared original articles on Treatment, Medicine, Surgery, etc., and other topics of interest to the student and practitioner; by leading members of the medical profession throughout the world. Edited by H. R. M. LANDIS, M.D, Phila., Pa. Published by J. B. Lippincott Company. Vol. I. Twenty-sixth Series, 1916.

In this volume we find a number of interesting articles presented for our consideration. The one on "Pellagra" by Beverly R. Tucker, M. D., is well illustrated and clearly defines the present status of this important disease.

Those interested in our national institutions will read with profit the article by John P. H. Murphy, M. D., entitled "The Wounded Mind," in which he describes St. Elizabeths, the Government Hospital for the Insane at Washington, D. C. It owes its inception to the efforts of Miss Dorothea Dix who had a bill introduced before Congress in 1852 for the establishment of a "Hospital for the Insane of the Army and Navy of the United States." The full-page illustrations, five in number, give one a good idea of this admirably conducted institution.

The latter portion of the volume deals with "A general review of medicine for the year 1915." Special emphasis is placed upon contagious and epidemic diseases; there is also a very readable section on Military Surgery, which is of peculiar interest at the present moment. H. D. C.

Military Medicine

MILITARY INSTRUCTION AND THE "ALBANY IDEA."

(*Concluded from October* ANNALS, *p. 500.*)

The admirable work done by the Clinical Club in Albany in military preparedness has been demonstrated by an important pamphlet recently issued. As the scheme is of such far-reaching value, it has been thought wise to reprint it in the ANNALS so that it may receive a larger circulation than the privately distributed pamphlet, and may also have permanent record.

The following named physicians are the members of the Clinical Club who have accomplished this large task: Dr. ARTHUR J. BEDELL, Dr. FREDERICK C. CONWAY, Dr. ERASTUS CORNING, Dr. JOSEPH A. COX, Dr. MALCOLM DOUGLAS, Dr. EUGENE E. HINMAN, Dr. ELLIS KELLERT, Dr. JOSEPH A. LANAHAN, Dr. JOSEPH P. O'BRIEN, Dr. DANIEL V. O'LEARY, Dr. JAMES F. ROONEY, Dr. HARRY RULISON, Dr. JAMES N. VANDER VEER.

DUTIES OF MEDICAL OFFICERS (*Continued*)

The following diseases, conditions and deformities shall cause rejection:

All forms of acute disease; contagious or communicable disease, every chronic organic disease; including rheumatism and gout; repeated attacks of acute articular and muscular rheumatism, or of sciatica; asthma, hay fever, chronic laryngitis, all forms of valvular heart disease, or of nephritis, high arterial tension, aneurism, hernia, epilepsy, mental aberration, depravity, cystitis, organic and chronic functional disease of the nervous system, marked knock-knee and bow legs, syphilis, all form of tuberculosis, chronic ulcers, deformities, and results of previous injuries of such degree as to manifestly render the recruit unfit for military duty, hydrocele, fistula in ano, the loss of a great toe, a thumb, or of any two fingers of a hand, hallux valgus, over-lapping toes of marked degree, hammer toe, severe corns or callosities, varicose veins, except that varicocele and hemorrhoids of very slight degree need not reject, prolapse of rectum, and any disfigurement or deformity constituting a well marked blemish of soldierly appearance, or local disease of deep or superficial character requiring constant attention to keep clean.

There are numerous conditions and diseases not mentioned in the foregoing, which should reject at once.

As disability occurring in the service is usually made the basis of a claim for pension, special care shall always be taken to state in the certificate on the physical examination blank form the degree of disability, to describe particularly the disability, wound or disease, the extent to which it deprives the soldier of the use of any limb or faculty, or affects his health, strength, activity, constitution or capacity to labor.

Special care shall be taken in the case of diseases or injuries liable to be feigned or purposely produced.

In the examination of certificates of disability for discharge, it is enjoined upon all concerned, to observe that there is no conflict between the statements of company commanders, medical and other officers thereon, as to whether the disability was incurred in line of duty or not in line of duty. If any discrepancy exists in this particular, every possible means shall be employed to harmonize the statements before forwarding the papers.

Whenever a patient is transferred from the care of one medical officer to another, a complete medical report of the case shall accompany him.

Enlisted men sick at recruiting stations, excepting those with trivial disabilities or those with severe injuries which render their removal impracticable, will be sent by the recruiting officer for treatment to the nearest military hospital.

When medical treatment, including medicine, nursing, and hospital care, is required by an officer, an enlisted man, a contract surgeon, an acting dental surgeon, or an army nurse, on duty with any command or detachment, by a prisoner in military custody, or by an applicant for enlistment held under observation, and cannot otherwise be had, the commanding officer may employ the necessary civilian service to furnish the same, and just accounts therefor will be paid by the Medical Department. When the officer, the contract surgeon, the acting dental surgeon, or the nurse who requires such treatment is on duty without troops, or the enlisted man is on duty where there is no officer, he or she may arrange for the required service. When medical treatment is required by the superintendent of the Nurse Corps while on duty and cannot otherwise be had she may in like manner procure the necessary civilian service, just accounts therefor to be paid by the Medical Department.

Accounts for the medical treatment of officers, enlisted men, contract surgeons, acting dental surgeons, the superintendent of the Nurse Corps and nurses absent from duty, and of the families and servants of officers and men are not payable from public funds. Accounts for consultation will not be allowed. Treatment of chronic complaints by a specialist will not be paid for unless authority to employ such specialist has been obtained from the Surgeon General. Surgical appliances will be paid for only upon satisfactory evidence of their necessity; and such evidence, except in cases of emergency, should be submitted to the Surgeon General for his approval before purchase. Accounts for hospital stores will be paid only for enlisted men.

A medical officer is responsible to his commanding officer that the allowance of medical property authorized for his command is always on hand and ready for immediate use or transportation.

A requisition for other remedies than those named in the supply table will be honored when the necessity for their use is clearly apparent. A statement of the reasons why special remedies are required shall be forwarded by the medical officer with his requisition.

Medical officers shall restrict their needs in active service to the articles mentioned in the supply tables as published in the Manual of the Medical Department, United States Army, and personal property of the medical officers shall not be used in the military service.

In all returns, estimates, requisitions, invoices and receipts, for medical supplies, the momenclature, order of entry, and classification of the Manual of the Medical Department shall be followed.

The course of instruction of the hospital corps shall be prescribed in the Manual of the Medical Department.

A detachment of the medical department serving with a regimental or smaller organization shall be under the immediate command of its senior medical officer.

On practice and service marches positions shall be taken as prescribed in field service regulations.

Medical officers shall be responsible to their commanding officers and senior officers of their department for the efficiency and discipline of the detachment under their command.

One or more of the privates of the hospital corps shall be designated by the medical officer commanding the detachment as ambulance driver. In addition to his other duties, he shall care for the ambulance, its equipment and harness, and see that they are always in readiness for immediate use. In the field he shall care for the animals.

Ambulances may be used for the transportation of the sick and injured, the absolutely necessary nurses or attendants on duty therewith, the instruction of the hospital corps, and in urgent cases, for the transportation of medical supplies, and all persons are prohibited from using them or requiring or permitting them to be used for any other purpose. It shall be the duty of the officers of the ambulance service to report to the commander of the troops any violation of the provisions of this section.

When members of the hospital corps are detailed for service or when left with the sick or wounded under circumstances which justify the expectation that their rights under the Geneva convention (F. S. R. 307) will not be recognized, commanding officers shall issue to members of the hospital corps pistols or other available firearms.

The surgeon of a post shall assign his assistants and the members of the hospital corps to duty.

Tents, clothing, hospital furniture, and other stores used in the treatment of contagious diseases may be disinfected or burned upon the recommendation and under the supervision of a medical officer.

Hospital property shall not be used for other than hospital purposes.

Medical officers shall furnish company commanders any information, except the diagnosis, which will assist them in determining whether or not the disability of a soldier who is or has been on sick report originated in the line of duty, entering this information in the company sick report book. When required they shall furnish the diagnosis to the commanding officer of the command to which they are attached.

A building will not be erected for or occupied as a hospital until the opinion of a medical officer has been obtained in writing upon the suitableness of site and proposed arrangement. If the commanding officer dissent from this opinion he will return it to the surgeon of the post with his reasons endorsed thereon, who will forward it, through the military channels, to the Surgeon General.

Hospitals will be erected at permanent posts in accordance with plans and specifications furnished by the Surgeon General, approved by the Secretary of War.

No portion of any hospital building at a military post will be used or occupied as quarters, nor will any mess be permitted or maintained therein except such as may be necessary for patients and enlisted men there on duty.

At sick call the enlisted men of each company who require medical attention will be conducted to the hospital or infirmary by a non-commissioned officer, who will give the attending medical officer the company sick report book containing the names of the sick. The medical officer, after examination, will indicate in the book, opposite their names, the men who are to be admitted to hospitals and those to be returned to quarters, noting what duties the latter can perform and any other information in regard to the sick which he may have to communicate to the company commander. The senior medical officer of every command (except independent medical units) promptly after sick call each morning will forward to the adjutant a report of the sick of the command on the prescribed form furnished by the Surgeon General. After the report has served its purpose at headquarters of the command the adjutant will enter in the proper columns the strength of the command for the day present and absent and return the report to the medical officer. Completed morning reports of sick will be preserved for a period of one year, unless the command is sooner discontinued, when they will be destroyed.

Medical officers and contract surgeons on duty will attend officers, enlisted men, contract surgeons, acting dental surgeons, members of the Nurse Corps, prisoners of war and other persons in military custody or confinement, and applicants for enlistment while held under observation; also, when practicable, the families of officers and enlisted men; and at stations, or in the field, where other medical attendance cannot be procured, civilian employees. Medicines will be dispensed to all persons entitled to medical attendance, and hospital stores to enlisted men and hospital matrons, also to officers at posts or stations where they can not be procured by purchase.

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The following directions are appended for the benefit of those who may forward material:

All specimens should be accompanied by a brief note of the clinical condition and a special reference to the character of the examination desired. Name and address of person to whom report is to be sent should be clearly indicated.

1.—Pathological material from either operation or autopsy should be wrapped in moist gauze surrounded by oiled paper or rubber protective. When it is not possible for material to reach the laboratory within twenty-four hours, it should be placed in alcohol (80%) or formalin solution (10%). Small fragments of tissue and the material from uterine curettage should always be so preserved.

2.—Sputum should be sent in clean wide-mouth bottles; the ordinary vaseline bottle answers all purposes. The same bottle is suitable for faeces. Urine should be in clean bottles containing not less than six ounces.

3.—Exudates and other material requiring a bacteriological examination by culture should be placed in containers previously sterilized by heat (not chemical disinfectants).

4.—Outfits for special purposes, as diphtheria cultures, Widal reaction, vaccines, Wassermann reactions, etc., will be sent upon application.

5.—Tissues and fluids for animal inoculation, e. g., hydrophobia, tetanus, tuberculosis, etc., are best sent packed in ice. In cases of suspected hydrophobia it is advisable to send the entire animal without injury to the brain or cord.

6.—Haematological examinations at the patient's home will be made by appointment.

7.—Milk and water for bacteriological examination should be sent in sterile glass containers, packed in ice. Special instructions for the collection of samples may be had upon application.

8.—Members of the staff are at all times available for the purpose of conducting post-mortem examinations.

9.—The fee for complete haematological examination at patient's home is $10.00; for post-mortem examination, according to the nature of the case and the time consumed; for the Wassermann reaction, $10.00; all other examinations, a uniform fee of $5.00. A special contract may be made for weekly or monthly examinations of milk. In the case of patients who cannot pay the full amount, these fees will be reduced.

Reports will be sent by telegraph if requested.

Letters and specimens should be addressed to

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Admission Requirements: Each candidate must furnish evidence of the satisfactory completion, in a recognized college or scientific school, of at least one year's course of study including, French, German or English, biology, physics and chemistry, or an equivalent. Beginning with January 1, 1918, two years of college work will be required. Classes are restricted in number. Women are admitted. Union College, the academic department of Union University, Schenectady, N. Y., has arranged for such a course.

Tuition: The charge for tuition is $160.00 a year and $5.00 for matriculation. There are no extra fees except for rental of microscopes, laboratory breakage, and certain expensive supplies.

The academic year begins Sept. 24, 1917. All inquiries and other communications should be addressed to Thomas Ordway, M.D., Dean, Albany Medical College, Albany, N. Y.